

Scaled data based on original data using
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: CORELITE

Report Number: P521480

Luminaire Tested: **SQ4-F-075U-100D-93050-1D-UNV-STD-W-4 (4000K)**

Issue Date: 5/5/2021

Test Information

Test Method: LM-79-08
Report Number: P521480
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2101-105-50,
Test Lab: INNOVATION CENTER
Issue Date: 5/5/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: CORELITE
Catalog Number: SQ4-F-075U-100D-93050-1D-UNV-STD-W-4 (4000K)
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE
DOWNLIGHT 1000 LUMENS PER FOOT
UPLIGHT 750 LUMENS PER FOOT
Light Source: 3000K/5000K CCT, 90 CRI LEDS, TUNED TO 4000K CCT
Ballast/Driver: ELECTRONIC DRIVER

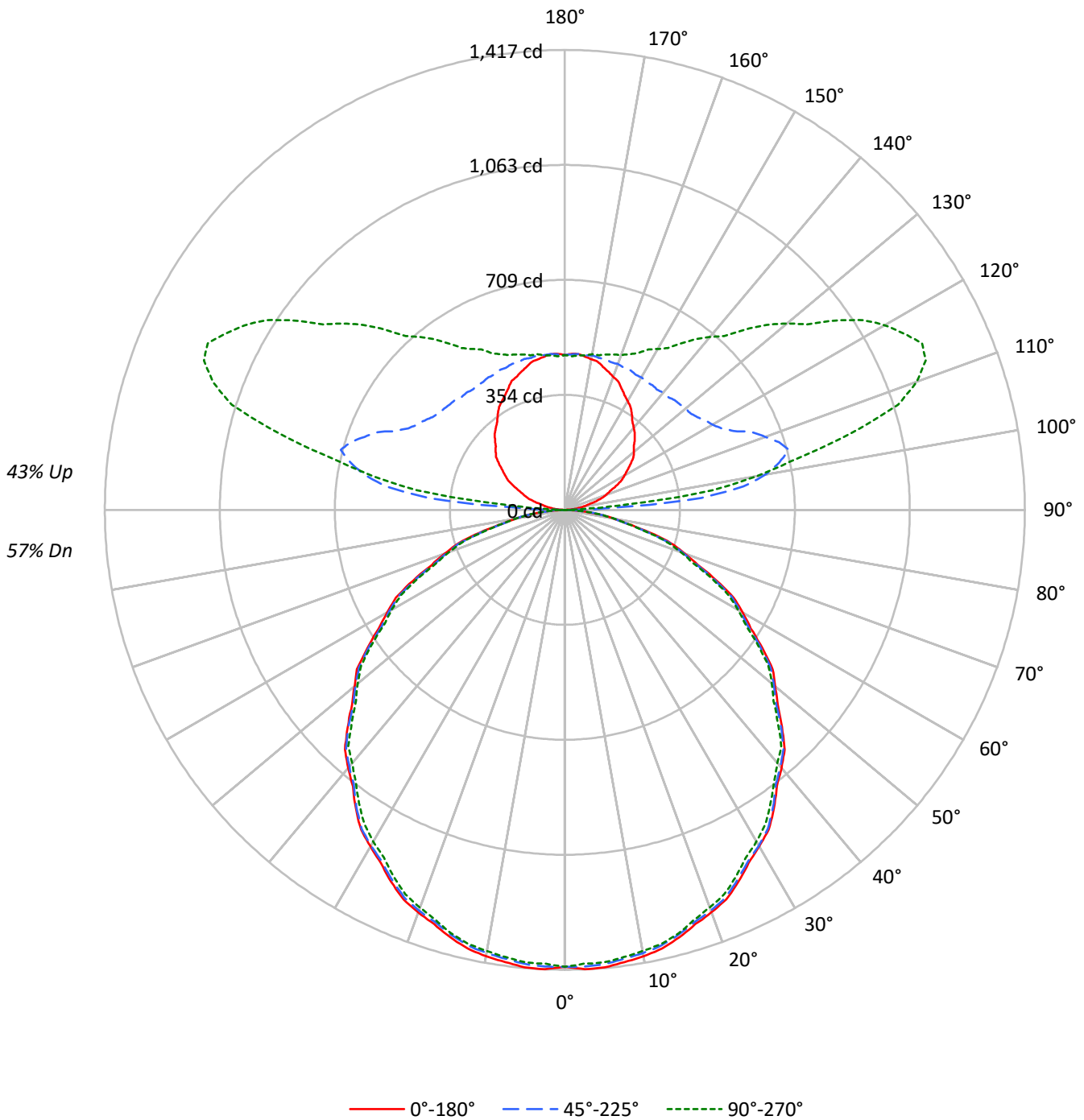
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 7107.3 lumens
Efficiency: N/A
Efficacy: 107.5 lumens/watt
Spacing Criteria (0/90/45): 1.27 / 1.25 / 1.38
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')
CIE Type: General Diffuse

Input Watts (W): 66.1
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT

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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20				20				20				20	
RC	80				70				50				30				10	0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR																		
0	109	109	109	109	101	101	101	101	87	87	87	74	74	74	62	62	62	57
1	99	95	91	87	92	88	85	82	76	73	71	65	63	61	55	53	52	47
2	90	82	76	71	83	77	71	67	66	62	59	57	54	51	48	46	44	39
3	82	72	65	59	76	67	61	55	58	53	49	50	46	43	42	39	37	33
4	75	64	56	50	69	60	52	47	52	46	42	44	40	37	38	34	32	28
5	69	57	49	42	64	53	46	40	46	40	36	40	35	32	34	30	27	24
6	63	51	43	37	59	48	40	35	42	36	31	36	31	28	31	27	24	21
7	59	46	38	32	54	43	36	31	38	32	27	33	28	24	28	24	21	19
8	54	42	34	28	50	39	32	27	34	28	24	30	25	22	26	22	19	17
9	51	38	30	25	47	36	29	24	31	26	22	27	23	19	24	20	17	15
10	47	35	28	23	44	33	26	22	29	23	20	25	21	18	22	18	16	14

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	12989	12989	12989
5°	13104	13010	12963
10°	13085	12990	12933
15°	13023	12945	12906
20°	12959	12899	12800
25°	12881	12808	12695
30°	12759	12727	12575
35°	12646	12601	12441
40°	12500	12440	12269
45°	12343	12277	12106
50°	12142	12070	11954
55°	11932	11818	11689
60°	11656	11525	11357
65°	11274	11053	10854
70°	10634	10388	10197
75°	9693	9368	9186
80°	7948	7948	7948
85°	5674	6415	6743



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	133.3	1.9
10°-20°	381.7	5.4
20°-30°	577.4	8.1
30°-40°	695.4	9.8
40°-50°	722.2	10.2
50°-60°	655.4	9.2
60°-70°	500.0	7.0
70°-80°	279.5	3.9
80°-90°	72.8	1.0
90°-100°	246.0	3.5
100°-110°	594.5	8.4
110°-120°	634.1	8.9
120°-130°	513.5	7.2
130°-140°	397.6	5.6
140°-150°	303.3	4.3
150°-160°	219.6	3.1
160°-170°	135.2	1.9
170°-180°	45.8	0.6
0°-30°	1092.4	15.4
0°-40°	1787.7	25.2
0°-60°	3165.3	44.5
0°-90°	4017.7	56.5
90°-120°	1474.5	20.7
90°-150°	2689.0	37.8
90°-180°	3090.0	43.5
0°-180°	7107.3	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1408	1408	1408	1408	1408	
5°	1415	1400	1405	1402	1400	134
15°	1363	1350	1355	1351	1351	385
25°	1265	1252	1258	1247	1247	583
35°	1123	1113	1119	1105	1105	702
45°	946	939	941	928	928	730
55°	742	740	735	727	727	664
65°	516	512	506	499	497	509
75°	272	268	263	259	258	286
85°	54	58	61	62	64	66
90°	0	0	0	0	0	3
95°	24	123	421	274	192	27
105°	95	164	714	924	913	100
115°	174	222	574	1088	1214	172
125°	248	285	498	866	1017	221
135°	304	340	478	682	785	235
145°	360	386	469	580	626	225
155°	412	430	475	514	533	190
165°	456	463	481	488	495	129
175°	482	480	482	478	477	46
180°	477	477	477	477	477	

TEST NUMBER: P521480

CATALOG NUMBER: SQ4-F-075U-100D-93050-1D-UNV-STD-W-4 (4000K)

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1407.8	1407.8	1407.8	1407.8	1407.8
2.5°	1416.7	1404.9	1408.6	1406.9	1399.7
5°	1414.9	1400.1	1404.8	1401.7	1399.7
7.5°	1405.6	1390.8	1395.5	1391.4	1390.2
10°	1396.7	1381.9	1386.6	1382.5	1380.5
12.5°	1384.6	1370.5	1375.3	1370.4	1370.0
15°	1363.4	1349.5	1355.3	1351.2	1351.2
17.5°	1338.5	1325.6	1331.6	1325.7	1324.7
20°	1319.9	1307.1	1313.8	1304.7	1303.7
22.5°	1298.9	1286.8	1292.8	1282.1	1282.7
25°	1265.3	1252.5	1258.2	1247.1	1247.1
27.5°	1226.7	1214.1	1221.3	1207.9	1207.1
30°	1197.6	1185.8	1194.6	1180.4	1180.4
32.5°	1168.5	1158.2	1164.7	1151.3	1148.9
35°	1122.8	1112.9	1118.8	1104.6	1104.6
37.5°	1072.7	1064.6	1067.6	1054.6	1057.5
40°	1037.9	1029.0	1032.9	1019.7	1018.7
42.5°	1002.4	994.3	997.3	984.2	987.2
45°	946.0	939.0	940.9	927.8	927.8
47.5°	888.8	883.6	882.1	870.4	872.4
50°	845.9	843.9	840.9	830.8	832.8
52.5°	807.1	802.8	798.8	789.5	790.7
55°	741.8	739.8	734.7	726.7	726.7
57.5°	679.4	675.0	669.0	660.8	660.8
60°	631.7	629.7	624.6	615.5	615.5
62.5°	586.4	583.6	577.7	569.4	568.6
65°	516.4	512.5	506.3	499.2	497.2
67.5°	443.5	439.3	434.4	427.7	426.5
70°	394.2	389.2	385.1	380.0	378.0
72.5°	344.0	341.5	336.5	331.5	330.3
75°	271.9	267.9	262.8	258.7	257.7
77.5°	195.7	195.1	193.2	190.6	191.6
80°	149.6	150.6	149.6	148.6	149.6
82.5°	108.3	110.9	110.8	110.6	111.6
85°	53.6	58.5	60.6	61.7	63.7
87.5°	15.4	20.1	24.3	25.1	25.9
90°	0.0	0.0	0.0	0.0	0.0
92.5°	8.1	66.6	156.9	76.3	51.7
95°	24.3	123.1	421.4	274.0	192.0
97.5°	43.1	136.3	555.0	534.7	459.0
100°	57.6	144.6	628.6	663.6	601.3
102.5°	71.4	152.0	677.1	770.9	733.9
105°	95.0	164.2	714.5	924.5	912.6
107.5°	118.2	178.5	692.5	1047.7	1075.5
110°	134.4	190.7	656.9	1100.8	1153.1



TEST NUMBER: P521480

CATALOG NUMBER: SQ4-F-075U-100D-93050-1D-UNV-STD-W-4 (4000K)

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	150.6	203.0	625.4	1113.7	1203.3
115°	173.8	222.3	574.0	1088.3	1213.8
117.5°	196.9	242.5	543.9	1029.8	1176.8
120°	212.2	254.7	524.5	983.8	1138.0
122.5°	228.4	267.7	512.4	936.9	1088.7
125°	247.6	285.2	498.2	865.5	1016.7
127.5°	266.6	302.0	488.3	805.1	937.9
130°	277.9	312.5	485.1	763.0	893.4
132.5°	288.4	324.6	480.3	732.6	843.3
135°	304.2	339.8	478.0	682.5	785.3
137.5°	319.2	354.9	471.0	648.6	726.0
140°	330.5	363.1	471.0	624.2	695.3
142.5°	341.8	374.4	466.9	602.9	663.0
145°	359.8	386.5	468.9	580.1	625.6
147.5°	376.6	402.5	467.7	553.9	591.4
150°	387.1	409.8	471.0	542.4	572.0
152.5°	398.4	420.3	470.2	530.2	556.7
155°	412.3	430.1	475.0	513.8	532.6
157.5°	429.1	444.3	474.0	507.6	518.7
160°	435.6	448.4	478.0	499.4	507.3
162.5°	446.1	457.4	476.4	496.9	501.7
165°	455.8	462.7	481.1	488.3	495.2
167.5°	467.7	472.3	479.9	487.7	487.9
170°	471.0	473.9	483.1	482.2	487.1
172.5°	476.6	478.8	480.7	482.8	479.9
175°	482.1	480.1	482.1	478.0	477.0
177.5°	481.1	481.1	479.4	477.7	473.8
180°	477.0	477.0	477.0	477.0	477.0

(END OF REPORT)